# City of Longmont Neighborhood Traffic Mitigation Program Manual



# **Prepared by:**

Department of Public Works & Water Utilities
Community Development Department
Fire Department
Police Department

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#### **WELCOME**

Welcome to the City of Longmont's Neighborhood Traffic Mitigation Program (NTMP). If you're reading this document, it is probably because you are concerned about the traffic in your neighborhood. Traffic in residential areas is a major concern throughout Longmont as well as in most other communities across the nation. This plan has been developed in an effort to help citizens work with the City to implement procedures to help reduce the impacts of traffic.

The City of Longmont NTMP was developed by a Traffic Mitigation Task Force comprised of City Staff from the Fire and Police Departments, Human Services and Planning Departments and the Department of Public Works & Water Utilities Department. In addition, the Task Force included representatives from City Council, the Neighborhood Group Leaders Association, and the Transportation Advisory Board.

The NTMP is comprised of two parallel programs. The first is a city-initiated program in which neighborhood collector roads are ranked and prioritized by city staff based on objective criteria developed by the Task Force. Streets will be selected for improvements by the City based on the greatest need. The City will subsequently approach and work with the residents to design and implement traffic calming proposals in order to address traffic related issues in an expedited fashion. The second is a citizen-initiated program. When residents call the City expressing a concern about traffic-related issues on local streets, they may initiate a process through which their street may be modified to mitigate speeding and other traffic related issues in their neighborhood.

At any time, feel free to contact Ben Ortiz, the City's Neighborhood Traffic Mitigation Program Coordinator at (303) 774-4728 or e-mail <a href="mailto:ben.ortiz@ci.longmont.co.us">ben.ortiz@ci.longmont.co.us</a> for any questions you may have. We look forward to working with you to improve the quality of life in your neighborhood.

## **TABLE OF CONTENTS**

WELCOME	i
TABLE OF CONTENTS	ii
PROGRAM OBJECTIVES, PROGRAM POLICIES	1
CITY AND CITIZEN- INITIATED PROGRAM PROCESS STEPS	4
CITY-INITIATED TRAFFIC MITIGATION PROGRAM	5
CITIZEN-INITIATED TRAFFIC MITIGATION PROGRAM	8
THE NEIGHBORHOOD TRAFFIC MITIGATION TOOLBOX	13
APPENDIX A: APPEALS	16
APPENDIX B: LEVEL 1 TRAFFIC MITIGATION TOOLS	17
APPENDIX C: LEVEL 2 TRAFFIC MITIGATION TOOLS	25
APPENDIX D: TRAFFIC SAFETY TIPS	31

#### PROGRAM OBJECTIVES

There are three objectives of the Neighborhood Traffic Mitigation Program:

- 1. Improve neighborhood livability by reducing the impact of vehicular traffic on residential streets.
- 2. Encourage citizen involvement in solutions to neighborhood traffic problems.
- 3. Make efficient use of City resources by prioritizing projects using objective criteria.

#### **PROGRAM POLICIES**

The following policies have been established for the Neighborhood Traffic Mitigation Program:

1. The City classifies streets based on their intended function. The streets are classified as follows:

<u>Arterial streets and primary collector streets</u> – Intended to move traffic quickly and efficiently around the City. Very little access to property is intended on these streets.

<u>Neighborhood collector streets</u> – Intended to collect traffic from neighborhoods and channel it to the arterial streets. These streets serve some traffic moving function but also serve to provide access to adjacent properties.

<u>Local streets</u> – Intended to provide access to property. These streets are not intended for through traffic movements.

- 2. Arterial Streets and primary collector streets are not eligible for physical or non-physical traffic calming design modifications through the NTMP. All traffic concerns regarding the arterial and primary collector street network are to be addressed with traffic enforcement only. Only local streets or neighborhood collector streets will be considered for traffic mitigation. The arterial and primary collector streets that <u>WILL NOT</u> be considered for traffic mitigation under this program include the following:
  - 3<sup>rd</sup> Avenue east of Main Street
  - 9<sup>th</sup> Avenue
  - 17<sup>th</sup> Avenue
  - 21<sup>st</sup> Avenue from Main Street to Hover Street
  - State Highway 66
  - Hover Street

- Main Street
- Nelson Road
- Pace Street
- Pike Road from Main Street to Hover Street
- Airport Road

- Clover Basin Drive from Hover Street to Airport Road
- Francis Street from 9<sup>th</sup> Avenue to State HWY 66
- S. Pratt Parkway from Ken Pratt Boulevard to 2nd Avenue

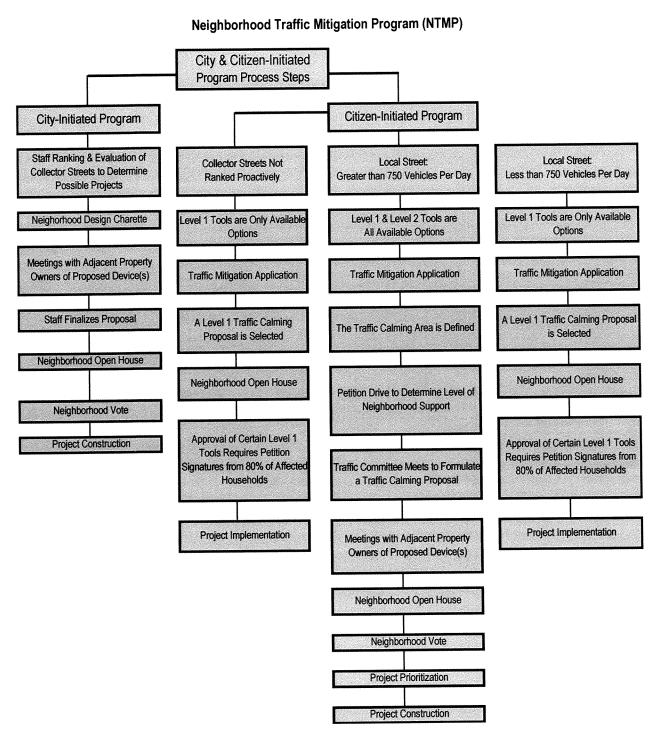
- Sunset Street from Pike Road to Boston Avenue
- Terry Street from 2<sup>nd</sup> Avenue to 3<sup>rd</sup> Avenue
- 3. Neighborhood collector streets shall be prioritized for treatment utilizing objective criteria as defined in the City-Initiated Neighborhood Traffic Mitigation Program (City Program). Individuals that would rather not wait for their street to move to the top of the list may initiate the Citizen-Initiated Neighborhood Traffic Mitigation Program (Citizen Program). Should they do so, however, the street would only be eligible for level 1 (non-physical) traffic calming tools. Neighborhood collector streets include the following:
  - 3<sup>rd</sup> Avenue west of Main Street
  - E. 5<sup>th</sup> Avenue
  - 11<sup>th</sup> Avenue
  - 15<sup>th</sup> Avenue
  - 19<sup>th</sup> Avenue
  - 21<sup>st</sup> Avenue east of Main Street and west of Hover Street
  - 23<sup>rd</sup> Avenue
  - Alpine Street
  - S. Bowen Street
  - Clover Basin Drive west of Airport Road
  - Collyer Street
  - Creekside Drive
  - Deerwood Drive
  - Fordham Street
  - Francis Street from 3<sup>rd</sup> Avenue to 9<sup>th</sup> Avenue
  - Gay Street
  - Harvard Street
  - Horizon Parkway

- Lashley Street
- Lefthand Drive
- Longs Peak Avenue
- Martin Street between 3<sup>rd</sup>
   Avenue and 9<sup>th</sup> Avenue
- Mountain View Avenue
- Northshore Drive
- Northwestern Road
- Olympia Avenue
- Pike Road from Fordham Street to Airport Road
- Quebec Avenue
- S. Pratt Parkway south of Ken Pratt Boulevard
- S. Sherman Street
- Spencer Street
- Sundance Drive
- Sunset Street between Boston and 11<sup>th</sup> Avenue, and between Pike Road and Plateau Road
- 4. Local streets shall be addressed through the Citizen Program only. Only local streets with traffic volumes in excess of 750 vehicles per day will be eligible for physical traffic calming devices. Local streets with volumes less than 750 vehicles per day may also initiate the Citizen Program process, however, these streets will only be eligible for level 1 (non-physical) traffic calming tools.

- 5. A designated "toolbox" of engineering, education and enforcement methods will be employed to address neighborhood traffic concerns on local and neighborhood collector streets. The tools available may vary based on the functional classification of the street, i.e. collector streets versus local streets. In addition, the tools that are available to local streets will also vary depending on pre-determined volume thresholds (see Policy 4 above.)
- 6. Some tools shown in the toolbox may not be available for all streets or all situations. City staff has the final say on what tools may be used. The City will consider the appropriateness of the tools on a case-by-case basis taking into account the impacts on adjacent residents, impacts on other area streets and city-wide transportation impacts. City staff reserves the right to deny the use of any proposed tool and may modify any proposal at any time.
- 7. Emergency vehicle response should not be impacted to such an extent that the City's emergency response benchmark couldn't be met. The benchmark would be met if 90% of all emergency calls are responded to in less than 5 minutes. Any traffic mitigation devices proposed for implementation that might impact fire response must be reviewed and approved by the Fire Department.
- 8. Bicycling and walking are important forms of transportation. During the development of traffic mitigation proposals these transportation modes should be taken into consideration so as not to preclude their safe use.
- 9. Arterial streets should be used for through traffic. Feasible opportunities for rerouting traffic from a local or neighborhood collector street to an arterial street should be explored.
- 10. Traffic mitigation will be done on a neighborhood basis not street by street. Traffic should not be re-routed from one street of higher classification to another of lower classification. Traffic may be rerouted to other streets of the same classification if the end result is a more equal distribution of the traffic burden.
- 11.STOP signs, cross walks, crossing guards, and the posting of lowered speed limits are <u>NOT</u> options that will be considered as part of this program.

## CITY AND CITIZEN- INITIATED PROGRAM PROCESS STEPS

The diagram below highlights both the City and Citizen- Initiated Neighborhood Traffic Mitigation Program processes.



Following is a description of the program steps for the City and Citizen- Initiated Neighborhood Traffic Mitigation Programs respectively:

#### CITY-INITIATED TRAFFIC MITIGATION PROGRAM

#### Step 1 - Collector Street Ranking

If you live on a street classified as a neighborhood collector, your street will be prioritized and placed on a project list for traffic mitigation treatments. The following objective criteria shall be used to prioritize neighborhood collector streets for traffic mitigation:

- <u>Traffic Speed</u> Based on average speed during non-peak times. Up to 20 points (2 points for each mile per hour over 30 mph) may be assigned.
- <u>Traffic Volume</u> Based on average daily traffic (ADT). Up to 20 points can be assigned (1.3 points per 1,000 ADT).
- <u>Accident History</u> Mid-block or intersection accident rates within the project boundary greater than the average accident rate for similar locations – 5 points, midblock or intersection within the project boundary designated as a high accident location on the City's most recent listing of high accident locations – 10 points.
- <u>Amount of Cut-Through Traffic</u> 15-25% traffic cutting through 2 points, 25-40% cut-through traffic 6 points, more than 40% cut-through 10 points.
- <u>Presence of School Crossings</u> 10 points if one or more designated elementary school crosswalks exist within the project boundary.
- <u>Presence of Adjacent Pedestrian Generators</u> 5 points if any of the following generators are within 1,000 feet of the street:
  - > Retail commercial uses
  - Institutional uses
  - > Parks
  - > Other schools not included in the school crossing criteria (e.g. middle school or high school)
- <u>Number of Affected Households</u> Up to 25 points may be assigned. Based on number of dwelling units (either single family or apartments) fronting the street. 4 points per 100 dwelling units per mile.

While the prioritized list is intended to objectively rank streets based on the greatest need, streets may be selected for mitigation by the City in a different priority order. A lower ranked street may be selected before a higher ranked street if City staff determines that it is beneficial to do so. For example, a lower ranked street may be scheduled for street maintenance and for cost purposes it would make sense to initiate the traffic calming improvements on such a street at the same time that the street maintenance is occurring.

Once a prioritized list of streets is compiled, City staff will contact all residents within the traffic calming area for the street on the list selected for improvements.

Traffic mitigation will be done on a neighborhood basis, not on a street-by-street basis. Thus, the traffic calming area shall include all streets that may be impacted by the installation of traffic calming devices and the subsequent diversion of traffic. If, however, traffic calming is being proposed for a street where the installation of traffic calming tools would not cause traffic diversion due to the physical characteristics of the street network, then only the residents of the specific street identified for improvement would be contacted. That is, the traffic calming process would involve only the street to be mitigated. The City Traffic Engineer would be responsible for defining the neighborhood traffic calming area based on professional knowledge of traffic patterns.

## Step 2 – Neighborhood Design Charette

The residents in the traffic calming area would be invited to a neighborhood design charette to develop a traffic calming proposal for the street(s) to be mitigated. City staff will guide the participating residents through this process and provide guidelines for the development of the traffic calming proposal. Some tools shown in the toolbox may not be available for all streets or all situations. City staff has the final say on what tools may be used. The City will consider the appropriateness of the tools on a case-by-case basis taking into account the impacts on adjacent residents, impacts on other area streets and city-wide transportation impacts.

The City views this as a collaborative process. If residents do not wish to pursue traffic calming the City would not require them to do so. During the course of working with neighborhood residents, a "do nothing" option will be presented to the neighborhood for its consideration. Should the residents choose the "do nothing" option, then the street will be placed back on the collector street prioritization list and reprioritized after two years time.

#### Step 3 – Meeting with Adjacent Property Owners

The placement of traffic mitigation devices may impact residents that reside in a home adjacent to a device. Consequently, City staff will work with the adjacent property owner(s)/resident(s) of proposed devices to come up with acceptable solutions. The City reserves the right to place a device at any location within publicly owned right-of-way and permission from adjacent property owners of a proposed device is not required for the placement of a device.

#### Step 4 - Open House

Following the design charette and subsequent meetings with adjacent property owners, City staff will evaluate the recommendations of the neighborhood and develop a final proposal after which the neighborhood would be invited to attend an open house at

which residents may review and make final comments on the proposal prior to the vote of the neighborhood.

## Step 5 – Neighborhood Vote

Once the proposal is finalized, the opinions of all the affected households in the traffic calming area shall be solicited through a mail-in vote. The vote will determine whether or not the traffic mitigation proposal is either accepted or rejected.

## Who Votes?

All affected households in the traffic calming area will be given the opportunity to vote. Affected households include residents of either single family or multi-family dwellings (either owners or renters), non-resident owners of single family units and the owners of multi-family dwellings/complexes located in the traffic calming area.

At least 50% plus 1 vote (simple majority) of the votes "cast" must be in favor of the proposal in order for it be approved. At this stage in the process, only those that vote will decide the action taken. Households that do not vote, give up their right to have a "say" in the final outcome. Residents are therefore strongly encouraged to participate in the voting process.

If there is less than a simple majority supporting the proposal, the process will be terminated. Should the project be rejected for lack of support, the collector street would not be eligible for traffic calming for two years after the vote. After this time, the street would be reprioritized and placed back on the list.

Collector street residents may wish to bypass the City Program if they do not want to wait for their street to be prioritized. Should they do so, however, the street would not be eligible for level 2 (physical) traffic calming devices. The procedure that a collector street resident would follow would be the same as the Citizen Program for local streets with average daily traffic less than 750 vehicles per day.

#### CITIZEN-INITIATED TRAFFIC MITIGATION PROGRAM

The Citizen-Initiated Neighborhood Traffic Mitigation Program (Citizen Program) allows residents to initiate a process through which a resident may affect changes to their street to address traffic-related issues.

While the Citizen Program is designed to address traffic-related issues on local neighborhood streets. Residents that live on neighborhood collector streets may also initiate the Citizen Program. However, should a resident initiate the Citizen Program process for a neighborhood collector street then the collector street would only be eligible for a level 1 traffic mitigation response.

Due to limited City resources, eligibility for physical traffic calming devices will be dependent on the amount of traffic on the street. Local streets with average daily traffic (ADT) less than 750 vehicles per day would only be eligible for a level 1 (non-physical) traffic calming response. Only local streets with ADT of 750 vehicles per day or more would be eligible for level 2 (physical) traffic calming devices.

Program Steps (Streets with ADT Less than 750 Vehicles per Day):

#### **Step 1 – Traffic Mitigation Application**

Individuals seeking traffic mitigation must fill out a traffic mitigation application. The applicant must collect no fewer than 5 signatures from residents of five different households that live on the same street for which traffic mitigation is being requested. The applicant must successfully fill out the application before the City would initiate Step 2. The five individuals that sign the application may be asked to participate on a neighborhood traffic steering committee.

## Step 2 – Definition of the Traffic Calming Area

Traffic mitigation will be done on a neighborhood basis, not on a street-by-street basis. The traffic calming area shall include all streets that could be impacted by the installation of traffic calming devices and the subsequent diversion of traffic. If, however, traffic calming is being requested for a street where the installation of traffic calming tools would not cause traffic diversion due to the physical characteristics of the street network, the traffic calming process would only involve the residents that live on the street to be mitigated. The City Traffic Engineer would be responsible for defining the neighborhood traffic calming area based on professional knowledge of traffic patterns.

#### Step 3 – Traffic Committee Meets to Draft a Proposal

The steering committee in consultation with City staff will draft a Level 1 traffic mitigation proposal. Level 1 traffic mitigation tools only include non-physical tools that may be implemented quickly and relatively inexpensively. Some Level 1 tools shown in the

toolbox may not be available for all streets or all situations. City staff has the final say on what tools may be used. The City will consider the appropriateness of the tools on a case-by-case basis taking into account the impacts on adjacent residents, impacts on other area streets and city-wide transportation impacts. Local streets that do not meet the required volume threshold of 750 ADT or more per day would not be eligible for physical traffic calming devices (Level 2 tools).

## Step 4 - Open House

Following the development of the level 1 proposal, an open house would be held if necessary at which time neighborhood residents could view the proposal, ask questions, and provide comments. Once feedback from the neighborhood is collected and considered a final proposal would be prepared by City staff.

## Step 5 – Petition Drive

Certain level 1 tools require approval from no less than 80% of the affected households in the traffic calming area (see page 15 for a list of level 1 tools requiring 80% support from affected households). Affected households include renters, resident owners, and non-resident owners of single family units and the owners of multi-family dwelling/complexes in the traffic calming area.

The traffic committee would be responsible for circulating the petitions and collecting signatures and would be given two months for any neighborhood canvassing effort to demonstrate level of support for the level 1 traffic calming proposal.

# Step 6 – Implement the Project

Should the traffic committee be successful in collecting the necessary number of signatures, the City would then implement the project as City staff and resources allow.

However, if the traffic committee is not successful in collecting the necessary number of signatures in the allotted two-month timeframe, then the Citizen Program process would be terminated for lack of neighborhood support and the neighborhood would not be permitted to reapply for traffic mitigation for two (2) years.

Program Steps (Streets with ADT Greater than 750 Vehicles per Day:

# **Step 1 – Traffic Mitigation Application**

Individuals seeking traffic mitigation must fill out a traffic mitigation application. The applicant must collect no fewer than 5 signatures from residents of five different households that live on the same street for which traffic mitigation is being requested. The applicant must successfully fill out the application before the City would initiate Step 2. The five individuals that sign the application may be asked to participate on a neighborhood traffic steering committee.

#### Step 2 – Petition Drive

Local streets that are eligible for a level 2 traffic calming response must collect signatures from no fewer than 80% of the affected households on the street for which traffic mitigation is being requested. Affected households include renters, resident owners, non-resident owners of single family units and multi-family units/complexes, that immediately front onto the street to be mitigated.

Signing the petition does not commit the neighborhood street to the installation of traffic mitigation devices. By signing the petition, the neighborhood residents are simply agreeing to move the process forward and propose the installation of traffic mitigation devices to the entire neighborhood within the traffic calming area. A vote of the neighborhood within the traffic calming area would be required to approve of any traffic mitigation proposal.

The traffic committee would be responsible for circulating and collecting petition signatures. The traffic committee would be given two months for any neighborhood canvassing effort to demonstrate level of support for implementing traffic calming in the neighborhood. If the traffic committee is not successful in collecting the necessary number of signatures in the allotted two-month timeframe, then the Citizen Program process would be terminated for lack of neighborhood support and the neighborhood would not be permitted to reapply for traffic mitigation for two (2) years.

### **Step 3 – Definition of the Traffic Calming Area**

Traffic mitigation will be done on a neighborhood basis, not on a street-by-street basis. The traffic calming area shall include all streets that could be impacted by the installation of traffic calming devices and the subsequent diversion of traffic. If, however, traffic calming is being requested for a street where the installation of traffic calming tools would not cause traffic diversion due to the physical characteristics of the street network, the traffic calming process would only involve the residents that live on the street to be mitigated. The City Traffic Engineer would be responsible for defining the neighborhood traffic calming area based on professional knowledge of traffic patterns.

#### Step 4 – Traffic Committee Meets to Draft a Proposal

Should the traffic committee be successful in collecting the necessary number of signatures, the steering committee in consultation with City staff would work together to develop a level 2 traffic mitigation proposal. Level 2 traffic mitigation tools include physical devices like speed humps, traffic circles, medians, and neckdowns to name a few. However, a local street that is eligible for level 2 traffic mitigation is not limited to physical devices. Level 1 traffic calming tools may be an adequate response and should be considered. Some tools shown in the toolbox may not be available for all streets or all situations. City staff has the final say on what tools may be used. The City will consider the appropriateness of the tools on a case-by-case basis taking into

account the impacts on adjacent residents, impacts on other area streets and city-wide transportation impacts.

## Step 5 – Meeting with Adjacent Property Owners

The placement of traffic mitigation devices may adversely impact individuals that reside in a home adjacent to a proposed device. Consequently, City staff is committed to working with the adjacent property owner(s)/resident(s) of proposed devices to come up with an acceptable plan/design. However, the City reserves the right to place a device at any location within publicly owned right-of-way without securing permission from adjacent property owners of a proposed device.

### Step 6 - Open House

Following the development of the traffic mitigation proposal, an open house would be held at which time neighborhood residents could view the proposal, ask questions, and provide comments. Once feedback from the neighborhood is collected and considered a finalized proposal would be prepared by City staff.

# Step 7 – Neighborhood Vote

Once the proposal is finalized, the opinions of all the affected households in the traffic calming area shall be solicited through a mail-in vote. The vote will determine whether or not the traffic mitigation proposal is either accepted or rejected.

## Who Votes?

All affected households in the traffic calming area will be given the opportunity to vote. Affected households include renters, resident owners, and non-resident owners of single family units and multi-family dwellings/complexes.

At least 50% plus 1 vote (simple majority) of the votes "cast" must be in favor of the proposal in order for it be approved. At this stage in the process, only those that vote will decide the action taken. Households that do not vote, give up their right to have a "say" in the final outcome. Residents are therefore strongly encouraged to participate in the voting process.

If there is less than a simple majority supporting the proposal, the process will be terminated. Should the project be rejected for lack of support, the local street would not be eligible to reapply for traffic calming for two years.

# Prioritizing Citizen-Initiated Program Applications for Implementation:

Every resident feels that their street's traffic problem deserves immediate attention. This is simply not possible, however. Consequently, the City must utilize a fair approach for selecting which local streets the City will work with first. With this in mind,

the City has developed the following approach for prioritizing local street traffic mitigation applications that are received by the City:

All applications will be processed in the order they are received. In the event that the City receives two or more applications on the same date then the street with the highest traffic volumes will be addressed first.

Applicants will be notified in writing of their traffic mitigation application's status in relation to other applications received by the City.

### City and Neighborhood Responsibilities

The City would be responsible for printing and mailing of materials including letters, flyers, and open house displays. The neighborhood traffic mitigation applicants would be responsible for recruiting individuals to participate on the neighborhood traffic steering committee (steering committee). In addition, the steering committee would be responsible for any canvassing efforts of neighborhood residents in efforts to demonstrate support for traffic mitigation. Finally, should the need arise, any leaflets or informational materials that must be distributed door-to-door would be the responsibility of the neighborhood traffic committee without exception.

## THE NEIGHBORHOOD TRAFFIC MITIGATION TOOLBOX

There are numerous tools available for addressing neighborhood traffic concerns. No two neighborhoods are exactly the same nor are their issues the same. Consequently, the appropriate tool(s) to use will vary from neighborhood to neighborhood.

Generally speaking, tools can be placed in one of three categories: education, enforcement, and engineering. For purposes of this program, however, the tools within the above categories are consolidated into level 1 (non-physical) and level 2 (physical) categories and a street's eligibility for the above tools will depend on certain predetermined objective criteria.

As you go through the list of tools on the following pages, keep in mind the problems you are trying to solve and match the tools to the specific problems they are effective at solving.

While we have tried to include a comprehensive list of tools, it is not an all-inclusive list. There may be other devices/ideas that could address specific problems. Other devices may be applicable in certain instances and can be considered on a neighborhood-by-neighborhood basis.

### What's not in the Toolbox!

There are a few commonly requested items that are not included in the toolbox. The following list of items will not be considered through this program without exception:

- STOP signs
- "SLOW Children Playing" signs
- Crosswalks
- Crossing Guards
- Reduced Speed Limit Zones
- Photo Radar
- Rumble Strips
- Drainage Cross pans (dips in the road)

These items are not included for a variety of reasons. STOP signs are reserved for use at intersections to define who has the right-of-way. When used as speed breakers, etc., they have been found to cause as many if not more problems than they solve. Because of this, they are not considered an option for neighborhood traffic mitigation.

"SLOW Children Playing" signs or other similar signs have also been given the thumbs down by researchers. At best, they have been found to do nothing. At worst the specific message on the signs may suggest to children or their parents that it is OK to play in the street and therefore introduce a false sense of security. There are other signs in the toolbox with less specific messages that we hope will provide notice to

motorists to slow down in a way that will not give the wrong message to kids or their parents.

Crosswalks, crossing guards and reduced speed limit school zones are all tools used in Longmont. They will continue to be used to address specific issues in school areas or at other locations where appropriate to assist pedestrians. However, they are not appropriate as neighborhood traffic mitigation tools. If you or your neighbors feel there is a need for these devices in your neighborhood, you should let the City know and we will investigate the need for them as part of our normal review of requests for these types of devices.

Photo radar is a tool being used in some cities around the country. However, the Longmont City Council did not believe that this tool should be used at this time. Cost issues (it is very expensive) and privacy issues played into their decision to not pursue photo radar.

Rumble strips are requested occasionally. Research has found that they are effective at warning drivers of unusual conditions (such as on the approach to a temporary construction zone) but are not effective at changing driver behavior when no unusual conditions exist. They have not been successful at changing driver behavior in neighborhoods and they cause significant amounts of noise. Because of these factors, they are not included as tools for neighborhood traffic mitigation.

Lastly drainage cross pans (dips) can be found at various locations around town. However, they are only used as a means to collect and remove water from the street system during rainstorms. They are not intended as traffic mitigation devices. For the most part, our experience with drainage cross pans – as well as the experience of other municipalities – has been negative as they relate to traffic rather than positive. We have seen accidents involving motorists, motorcyclists and bicyclists related to the drainage pans. A design that will contain water properly and control the speeds of traffic safely has yet to be found. Currently, City design standards do not allow cross pans on streets with through traffic. They are only allowed on STOP sign controlled intersection approaches where traffic is stopping anyway. Efforts have been made over the years to remove or minimize the impacts of drainage pans in already built parts of the City that do not meet this standard. They will not be considered for use as traffic mitigation tools.

## The Tools

Following is a list of tools available through the program. This is not an all-inclusive list and other ideas will also be considered on a neighborhood-by-neighborhood basis. We would encourage neighborhoods to be creative in selecting tools. The tools are shown by the level they are intended for. That said, there is nothing that says a level 1 tool cannot be used in a level 2-eligible neighborhood. For a full description of the tools, see Appendices B and C.

# The Traffic Mitigation Toolbox by Level

Level 1 (Non Physical) Tools:	Petitions Required?
"Please Slow Down" Yard Signs	NO
"Speed Limit 25" signs	NO
Radar Speed Trailers	NO
Directed Police Patrols	NO
Neighborhood Speed Pledge	NO
Citizen Volunteer Patrol	NO
Neighborhood Speed Campaign	NO
Innovative Permanent Signage	YES
One-Way Sreets	YES
On-Street Parking Modifications	YES
Street Striping, e.g. Bike Lanes & Psycho Perceptive Pavement Markings	YES
Turn Prohibitions	YES

Level 2 (Physical) Tools:	Petitions & Vote Required?
Chicanes (Roadway Path Deviations)	YES
Closures	YES
Combination Devices, e.g. median combined with a speed table	YES
Concrete Treatments, e.g. Concrete Colorization	YES
Diagonal Diverters	YES
Medians	YES
Mid-block Chokers (Pinch Points)	YES
Neckdowns	YES
Neighborhood Identification Islands	YES
Pedestrian Refuge Islands	YES
Permanent Speed Display Units	YES
Raised Crosswalks	YES
Raised Intersections	YES
Speed Humps	YES
Speed Tables	YES
Split Speed Tables	YES
Road Narrowings (Using Physical Measures, e.g. Planting Strips)	YES
Street Trees and Vegetation	YES
Traffic Circles	YES